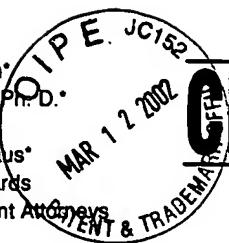


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March 8, 2002

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

TRANSMITTAL FOR INFORMATION DISCLOSURE STATEMENT:
BEFORE PAYMENT OF ISSUE FEE

Commissioner of Patents and Trademarks
 Washington, D.C. 20231

Sir:

Transmitted herewith for filing and pursuant to 37 C.F.R. § 1.97 is an Information Disclosure Statement.

Enclosed also are the following designated documents, as required under 37 C.F.R. §§ 1.97 and 1.98:

- Form PTO-1449 list of fourteen references submitted for consideration.
- Legible copies of the listed references or their relevant portions.
- All English translations of each nonenglish reference, if any, within the possession, custody, control or availability of anyone designated in 37 C.F.R. § 1.56(c) (see 37 C.F.R. § 1.98(c)).

The following are included within the Information Disclosure Statement if applicable and as required under 37 C.F.R. § 1.98:

- Concise explanation of relevance of each reference not in English and unaccompanied by an English translation.
- Statement that certain listed references not enclosed are substantially cumulative of an enclosed reference.

Commissioner for Patents
March 8, 2002
Page 2

- Statement that certain listed references not enclosed were previously cited by or submitted to the Office in the identified prior application which is relied upon for an earlier filing date under 35 U.S.C. § 120.

In order to secure consideration of the items designated above, one or more of the following, if required, is also enclosed:

- Promptness Certification.
- Check No. ***[_____]*** in the amount of ***[\$ (amount in § 1.17(p))]*** constituting the submission fee set forth in 37 C.F.R. § 1.17(p).
- Petition for Consideration and Check No. ***[_____]*** in the amount of ***[\$(amount in § 1.17(i)(1))]*** constituting the petition fee set forth in 37 C.F.R. § 1.17(i)(1).
- In the event that 37 C.F.R. § 1.97(c) applies and the Examiner is not satisfied that the Promptness Certification meets the requirements of 37 C.F.R. § 1.97(e), or in any other event remediable by a fee, please credit any over payment or charge any additional fees to Deposit Account No. 50-0836 of the undersigned.

Dated this 8th day of March, 2002.

Respectfully submitted,



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AJH/hf

Enclosures: Supplemental Information Disclosure Statement
Form PTO 1449 with attachments
Postcard



Attorney Docket No. T9479.B

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANT: RAYMOND F. GESTELAND,)
et al.)
TITLE: FINDING ACTIVE)
ANTISENSE)
OLIGONUCLEOTIDES)
USING ARTIFICIAL)
NEURAL NETWORKS) INFORMATION DISCLOSURE
SERIAL NO.: 10/050,888) STATEMENT UNDER 37 C.F.R.
FILED: January 14, 2002) § 1.97
EXAMINER: _____)
ART UNIT: _____)

Commissioner for Patents
Washington, D.C. 20231

Sir:

Please find, pursuant to 37 C.F.R. § 1.98(a)(1), the enclosed Form PTO-1449, which contains a list of patents, publications, or other items that have come to the attention of one or more of the individuals designated in 37 C.F.R. § 1.56(c). Applicants respectfully invoke the Patent Office's obligation under 37 C.F.R. § 1.97 to consider these references and make them of record in the above-captioned application. While no representation is made that

Certificate of Deposit Under 37 C.F.R. § 1.8

I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail, postage prepaid, in an envelope addressed to Commissioner for Patents, Washington, D.C. 20231, on the 8th day of March, 2002.



Alan J. Howarth, Ph.D.
Attorney Registration No. 36,553

any of these references may be "prior art" within the meaning of that term under 35 U.S.C. §§ 102 or 103, the enclosed list of references is disclosed so as to fully comply with the duty of disclosure set forth in 37 C.F.R. § 1.56.

Moreover, while no representation is made that a specific search of office files or patent office records has been conducted or that no better art exists, the undersigned attorney of record believes that the references listed, together with any other references that may have been previously cited by or submitted to the Office, are the closest to the claimed invention (taken in its entirety) of which the undersigned is presently aware, and no art that is closer to the claimed invention (taken in its entirety) has been knowingly withheld.

In accordance with 37 C.F.R. §§ 1.97 and 1.98, a copy of each listed reference (or relevant portion thereof) that was not previously submitted to, or cited by, the Patent Office is also enclosed.

Please charge any additional fees or credit any overpayment to
Deposit Account No. 50-0836.

DATED this 8th day of March, 2002.

Respectfully submitted,



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| PTO-1449 | U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE | | ATTY. DOCKET NO. T9479.B | SERIAL NO. 10/050,888 |
| LIST OF PRIOR ART CITED BY APPLICANT <i>O I P E</i> <i>MAR 12 2002</i> <i>PATENT & TRADEMARK OFFICE</i> | | APPLICANT Raymond F. Gesteland, et al. | | |
| | | FILING DATE January 14, 2002 | GROUP | |
| U.S. PATENT DOCUMENTS - None | | | | |
| FOREIGN PATENT DOCUMENTS - None | | | | |
| OTHER PRIOR ART (Including Author, Title, Volume and/or Name of Publication, Relevant Pages and Date [as available]) | | | | |
| AR | O.V. Matveeva, et al., Identification of sequence motifs in oligonucleotides whose presence is correlated with antisense activity; Nucleic Acids Research, 2000, Vol. 28, No. 15, pgs. 2862-2865. | | | |
| AS | Volker Patzel, et al., A theoretical approach to select effective antisense oligodeoxyribonucleotides at high statistical probability; Nucleic Acids Research, 1999, Vol. 27, No. 22, pgs. 4328-4334. | | | |
| AT | Siew Peng Ho, et al., Potent antisense oligonucleotides to the human multidrug resistance-1 mRNA are rationally selected by mapping RNA-accessible sites with oligonucleotide libraries; Nucleic Acids Research, 1996, Vol. 24, No. 10, pgs. 1901-1907. | | | |
| AU | Olga Matveeva, et al., Prediction of antisense oligonucleotide efficacy by in vitro methods; Nature Biotechnology, Dec. 1998, Vol. 16, pgs. 1374-1375. | | | |
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| AX | Michael C. Giddings, et al., ODNBase—a web database for antisense oligonucleotide effectiveness studies; Bioinformatics Applications Note, 2000, Vol. 16, No. 9, pgs. 843-844. | | | |
| AY | Naoki Sugimoto, et al., Thermodynamic Parameters To Predict Stability of RNA/DNA Hybrid Duplexes; Biochemistry, 1995, Vol. 34, pgs. 11211-11216. | | | |
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| BA | Brett P. Monia, et al., Antitumor activity of a phosphorothioate antisense oligodeoxynucleotide targeted against C-raf kinase; Nature Medicine, June 1996, Vol. 2, No. 6, pgs. 668-675. | | | |
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| BD | Stanislaw M. Stepkowski, et al., Blocking of Heart Allograft Rejection by Intercellular Adhesion Molecule-1 Antisense Oligonucleotides Alone or in Combination with Other Immunosuppressive Modalities; The Journal of Immunology, 1994, Vol. 153, pgs. 5336-5346. | | | |
| BE | Jennifer L. Duff, et al., Mitogen-activated Protein (MAP) Kinase Is Regulated by the MAP Kinase Phosphatase (MKP-1) in Vascular Smooth Muscle Cells; The Journal of Biological Chemistry, March 31, 1995, Vol. 270, No. 13, pgs. 7161-7166. | | | |
| EXAMINER | | | DATE CONSIDERED | |
| *EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. | | | | |